

IN THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Original) A computer program product for processing of substrates in at least a part of a substrate processing system, comprising:

- software code configured to obtain at least one of a rate of processing and a time of processing associated with a plurality of substrate lots to be introduced into a part of the substrate processing system; and
- software code configured to determine an order of introduction of the plurality of substrate lots into the part of the substrate processing system to at least one of increase the rate of processing and decrease the time of processing of the plurality of substrate lots.

2. (Currently Amended) The computer program product according to claim 1, wherein said code configured to obtain at least one of the rate of processing and the time of processing comprises code configured to obtain, for each lot type of the plurality of lots lot types, the time of processing required to change a setup of a part of the substrate processing system handling that lot type to handle each of one or more other lot types of the plurality of lots.

3. (Original) The computer program product according to claim 1, wherein said code configured to determine an order comprises code configured to determine an order of the plurality of lots with the least processing time to change a setup of a part of the substrate processing system for the plurality of lots.

4. (Original) The computer program product according to claim 1, wherein said code configured to obtain at least one of the rate of processing and the time of processing comprises code configured to obtain at least one of the rate of processing and the time of processing of each lot type of the plurality of lots through a part of the substrate processing system.

5. (Original) The computer program product according to claim 1, wherein said code configured to determine an order comprises code configured to sort the order of the plurality

of lots so that the difference between the at least one of rate of processing and time of processing of consecutive lots is reduced.

6. (Original) The computer program product according to claim 1, wherein said code configured to determine an order comprises code configured to select the order of the plurality of lots having the lowest overall processing time or rate of the processing times or rates for all the order permutations of the plurality of lots.

7. (Currently Amended) The computer program product according to claim 1, wherein:

- said code configured to obtain at least one of the rate of processing and the time of processing comprises code configured to obtain, for each lot type of the plurality of lots, the time of processing required to change a setup of a part of the substrate processing system handling that lot type to handle each of the one or more other lot types of the plurality of lots and to obtain at least one of the rate of processing and time of processing of each lot type of the plurality of lots through a part of the substrate processing system; and
- said code configured to determine an order comprises code configured to select the order of the plurality of lots having the lowest overall processing time or rate of the processing times or rates for all the order permutations of the plurality of lots.

8. (Original) The computer program product according to claim 1, wherein said code configured to obtain at least one of the rate of processing and the time of processing comprises code configured to calculate the at least one of the rate of processing and time of processing using a recipe associated with one or more lots of the plurality of lots and using setup information regarding the part of the substrate processing system.

9. (Original) The computer program product according to claim 1, wherein said substrate processing system comprises a lithographic apparatus and a track.

10. (Original) The computer program product according to claim 1, wherein said computer program product is operated externally from a lithographic apparatus and a track.

11. (Currently Amended) The computer program product according to claim 1, further comprising code configured to schedule the introduction of the plurality of lots into the part of the substrate processing system according to the order.

12. (Original) A method for processing of substrates in at least a part of a substrate processing system, comprising:

- obtaining, using a processing unit, at least one of a rate of processing and a time of processing associated with a plurality of substrate lots to be introduced into a part of the substrate processing system; and
- determining, using the processing unit, an order of introduction of the plurality of substrate lots into the part of the substrate processing system to at least one of increase the rate of processing and decrease the time of processing of the plurality of substrate lots.

13. (Currently Amended) The method according to claim 12, wherein said obtaining comprises obtaining, for each lot type of the plurality of lots lot types, the time of processing required to change a setup of a part of the substrate processing system handling that lot type to handle each of one or more other lot types of the plurality of lots.

14. (Original) The method according to claim 12, wherein said determining an order comprises determining an order of the plurality of lots with the least processing time to change a setup of a part of the substrate processing system for the plurality of lots.

15. (Original) The method according to claim 12, wherein said obtaining comprises obtaining at least one of the rate of processing and the time of processing of each lot type of the plurality of lots through a part of the substrate processing system.

16. (Original) The method according to claim 12, wherein said determining an order comprises sorting the order of the plurality of lots so that the difference between the at least one of rate of processing and time of processing of consecutive lots is reduced.

17. (Original) The method according to claim 12, wherein said determining an order comprises selecting the order of the plurality of lots having the lowest overall processing time or rate of the processing times or rates for all the order permutations of the plurality of lots.

18. (Currently Amended) The method according to claim 12, wherein:

- said obtaining comprises obtaining, for each lot type of the plurality of lots, the time of processing required to change a setup of a part of the substrate processing system handling

that lot type to handle each of the one or more other lot types of the plurality of lots and obtaining at least one of the rate of processing and time of processing of each lot type of the plurality of lots through a part of the substrate processing system; and

- said determining an order comprises selecting the order of the plurality of lots having the lowest overall processing time or rate of the processing times or rates for all the order permutations of the plurality of lots.

19. (Original) The method according to claim 12, wherein said substrate processing system comprises a lithographic apparatus and a track.

20. (Original) The method according to claim 12, wherein said obtaining comprises calculating the at least one of the rate of processing and time of processing using a recipe associated with one or more lots of the plurality of lots and using setup information regarding the part of the substrate processing system.

21. (Currently Amended) A lithographic apparatus comprising:

- an illuminator configured to ~~condition a~~ ~~provide a~~ ~~projection~~ beam of radiation;
- a support structure configured to hold a patterning device, the patterning device configured to pattern the ~~projection~~ beam according to a desired pattern;
- a substrate table configured to hold a substrate;
- a projection system configured to project the patterned beam onto a target portion of the substrate; and
- a processing unit configured to obtain at least one of a rate of processing and a time of processing associated with a plurality of substrate lots to be introduced into a part of a substrate processing system and to determine an order of introduction of the plurality of substrate lots into the part of the substrate processing system to at least one of increase the rate of processing and decrease the time of processing of the plurality of substrate lots.

22. (Original) The lithographic apparatus according to claim 21, wherein the processing unit is configured to calculate the at least one of the rate of processing and time of processing using a recipe associated with one or more lots of the plurality of lots and using setup information regarding the lithographic apparatus.

23. (Currently Amended) The lithographic apparatus according to claim 21, wherein:

- the processing unit is configured to obtain, for each lot type of the plurality of lots, the time of processing required to change a setup of a part of the substrate processing system handling that lot type to handle each of ~~the~~ one or more other lot types of the plurality of lots and to obtain at least one of the rate of processing and time of processing of each lot type of the plurality of lots through a part of the substrate processing system; and
- the processing unit is configured to select the order of the plurality of lots having the lowest overall processing time or rate of the processing times or rates for all the order permutations of the plurality of lots.

24. (Original) A track comprising:

- a coater configured to apply a layer of radiation-sensitive material to a substrate;
- a developer configured to develop an exposed substrate; and
- a processing unit configured to obtain at least one of a rate of processing and a time of processing associated with a plurality of substrate lots to be introduced into a part of a substrate processing system and to determine an order of introduction of the plurality of substrate lots into the part of the substrate processing system to at least one of increase the rate of processing and decrease the time of processing of the plurality of substrate lots.

25. (Original) The track according to claim 24, wherein the processing unit is configured to calculate the at least one of the rate of processing and time of processing using a recipe associated with one or more lots of the plurality of lots and using setup information regarding the track.

26. (Currently Amended) The track according to claim 24, wherein:

- the processing unit is configured to obtain, for each lot type of the plurality of lots, the time of processing required to change a setup of a part of the substrate processing system handling that lot type to handle each of ~~the~~ one or more other lot types of the plurality of lots and to obtain at least one of the rate of processing and time of processing of each lot type of the plurality of lots through a part of the substrate processing system; and
- the processing unit is configured to select the order of the plurality of lots having the lowest overall processing time or rate of the processing times or rates for all the order permutations of the plurality of lots.